



UNITED STATES PATENT AND TRADEMARK OFFICE

UNITED STATES DEPARTMENT OF COMMERCE

United States Patent and Trademark Office

Address: COMMISSIONER FOR PATENTS

P.O. Box 1450

Alexandria, Virginia 22313-1450

www.uspto.gov

APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
10/581,246	10/01/2008	Fredrik Jansson	4147-168	1783
23117 7590 05/12/2009 NIXON & VANDERHYE, PC 901 NORTH GLEBE ROAD, 11TH FLOOR ARLINGTON, VA 22203				
EXAMINER				
MASUR, PAUL H				
ART UNIT		PAPER NUMBER		
2416				
MAIL DATE		DELIVERY MODE		
05/12/2009		PAPER		

Please find below and/or attached an Office communication concerning this application or proceeding.

The time period for reply, if any, is set in the attached communication.

Office Action Summary

Application No.

10/581,246

Applicant(s)

JANSSON ET AL.

Examiner

Paul Masur

Art Unit

2416

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --
Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) OR THIRTY (30) DAYS, WHICHEVER IS LONGER, FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

Status

- 1) ☒ Responsive to communication(s) filed on 31 May 2006.
- 2a) ☐ This action is **FINAL**. 2b) ☒ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

Disposition of Claims

- 4) ☒ Claim(s) 1-14 is/are pending in the application.
- 4a) Of the above claim(s) _____ is/are withdrawn from consideration.
- 5) ☐ Claim(s) _____ is/are allowed.
- 6) ☒ Claim(s) 1-14 is/are rejected.
- 7) ☐ Claim(s) _____ is/are objected to.
- 8) ☐ Claim(s) _____ are subject to restriction and/or election requirement.

Application Papers

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☐ The drawing(s) filed on _____ is/are: a) ☐ accepted or b) ☐ objected to by the Examiner.
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).
Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

Priority under 35 U.S.C. § 119

- 12) ☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☐ All b) ☐ Some * c) ☐ None of:
1. ☐ Certified copies of the priority documents have been received.
 2. ☐ Certified copies of the priority documents have been received in Application No. _____.
 3. ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

* See the attached detailed Office action for a list of the certified copies not received.

Attachment(s)

- 1) ☒ Notice of References Cited (PTO-892)
- 2) ☐ Notice of Draftsperson's Patent Drawing Review (PTO-948)
- 3) ☒ Information Disclosure Statement(s) (PTO/SF/ICE)
Paper No(s)/Mail Date See Continuation Sheet
- 4) ☐ Interview Summary (PTO-413)
Paper No(s)/Mail Date _____
- 5) ☐ Notice of Informal Patent Application
- 6) ☐ Other: _____

Continuation of Attachment(s) 3). Information Disclosure Statement(s) (PTO/SB/08), Paper No(s)/Mail Date :05/31/2006, 09/14/2006, & 02/24/2009.

DETAILED ACTION

Claim Objections

1. **Claims 1-14 are objected to because of the following informalities: the term "characterise" should be spelled "characterize."** Appropriate correction is required.

Claim Rejections - 35 USC § 101

2. **35 U.S.C. 101 reads as follows:**

Whoever invents or discovers any new and useful process, machine, manufacture, or composition of matter, or any new and useful improvement thereof, may obtain a patent therefor, subject to the conditions and requirements of this title.

3. **Claims 1-7 are rejected under 35 U.S.C. 101 because the claimed invention is directed to non-statutory subject matter.** These claims fail to recite any structural tie to any class of invention and therefore do not satisfy the threshold tie to be eligible for patent protection under 35 USC 101. While the claims recite a series of steps or acts to be performed, a statutory "process" under 35 U.S.C. 101 must (1) be tied to another statutory category (such as a particular apparatus), or (2) transform underlying subject matter (such as an article or material) to a different state or thing. The instant claims neither transform underlying subject matter nor positively tie to another statutory category that accomplishes the claimed method steps, and therefore do not qualify as a statutory process. For example, claim 1 is directed to a method that includes the steps of defining, detecting, and controlling that appear purely directed to mental steps or mathematical manipulations of functions that fails to positively recite the other statutory class (machine or apparatus) to which it is tied by identifying the machine or apparatus that accomplishes the method steps. The steps might imply that a machine or apparatus is being used, but the steps do not inherently require the machine/apparatus.

Therefore, the method is not a patent eligible process under 35 USC 101 because it is being directed to non-statutory subject matter. See Federal Circuit Court Decision, In re Bilski, Appeal No.2007-1130.

Claim Rejections - 35 USC § 103

4. The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negated by the manner in which the invention was made.

5. Claims 1-4 are rejected under 35 U.S.C. 103(a) as being unpatentable over Labonte et al. (US Patent No. 6,073,257) in view of Mishra (US Patent No. 6,950,402) and Melero (US Patent No. 6,928,267).

6. As per claim 1, Labonte et al. teaches a method for call case controlled block error rate (BLER) or bit error rate (BER) target setting for a radio link in a Code Division Multiple Access (CDMA) Mobile to Mobile (MTM) and Mobile to Public Switched Telephone Network (MTPSTN) communication system, characterised by the step of:

defining a desired total BLER/BER target value [Labonte, column 2, lines 30-34, "The system includes means for estimating the BER on an uplink and a downlink on a user channel, and means for determining whether the BER on the uplink and the downlink on the user channel are below a first threshold", The combined BER, of the uplink and downlink, is compared to a threshold.].

Labonte et al. does not teach detecting if a call is MTM or MTPSTN; and in case of a MTM call; and controlling the BLER/BER on a second link to give a total BLER/BER according to the total BLER/BER target.

However, Mishra teaches detecting if a call is MTM or MTPSTN [Mishra, fig. 5, step 510, column 5, lines 11-12, "If the outside act is an incoming call, the media type of the incoming call is determined, act 510", The call type is determined for the incoming call to determine the connection needed (see fig. 1).].

Thus it would have been obvious to one of ordinary skill in the art at the time the invention was made to implement the teachings of Mishra into Labonte et al., since Labonte et al. suggests a target BER value, and Mishra suggests the beneficial use of examining a media packet such as to determine the media type [Mishra, fig. 5, step 510, column 5, lines 11-12] in the analogous art of mobile communications.

Melero teaches in case of a MTM call [Melero, column 2, lines 20-24, "In a cellular radio communication system, such as the GSM based systems, voice quality in a transmission over a communication path between a base station and a mobile station can be assessed based on a network indicator determined for the connection", Mobile to Mobile calls occur in a GSM network, and the links between the mobile units can be controlled via the base station.] controlling the BLER/BER on a second link to give a total BLER/BER according to the total BLER/BER target [Melero, column 5, lines 50-54, "The base station is arranged to measure an uplink bit error rate (UL BER) for the transmission received from the mobile station. The UL BER is reported to the BSC in order to be used for statistics and the handover and power control mechanisms", The

base station can control a BER level of multiple mobile terminals through power control according to statistics.].

Thus it would have been obvious to one of ordinary skill in the art at the time the invention was made to implement the teachings of Melero into Labonte et al., since Labonte et al. suggests a target BER value, and Melero suggests the beneficial use of controlling a link BER such as to reach a total system BER [Melero, column 2, lines 20-24 & column 5, lines 50-54] in the analogous art of controlling and monitoring bit error rates.

7. **As per claim 2**, Labonte et al. in view of Mishra and Melero teaches the method according to claim 1. Labonte et al. does not teach characterised by the further step of: detecting if a call is MTM or MTPSTN by inspecting frame types to be sent on the second link.

However, Mishra teaches characterised by the further step of: detecting if a call is MTM or MTPSTN by inspecting frame types to be sent on the second link [Mishra, fig. 5, step 510, column 5, lines 11-12, "If the outside act is an incoming call, the media type of the incoming call is determined, act 510", The call type is determined for the incoming call to determine the connection needed (see fig. 1).].

Thus it would have been obvious to one of ordinary skill in the art at the time the invention was made to implement the teachings of Mishra into Labonte et al., since Labonte et al. suggests a target BER value, and Mishra suggests the beneficial use of examining a media packet such as to determine the media type [Mishra, fig. 5, step 510, column 5, lines 11-12] in the analogous art of mobile communications.

8. **As per claim 3**, Labonte et al. in view of Mishra and Melero teaches the method according to claim 1. Labonte et al. also teaches characterised by the further step of... separately setting a first BLER/BER target for the first link [Labonte, column 2, lines 44-45, "whether the BER on the downlink on the FACCH channel is below a second threshold"] and a second BLER/BER target the second link [Labonte, column 2, lines 45-46, "whether the RBER on the uplink is below a third threshold"] such that a sum of the first and second BLER/BER targets will be equal to the total BLER/BER target [Labonte, column 2, lines 30-34, "The system includes means for estimating the BER on an uplink and a downlink on a user channel, and means for determining whether the BER on the uplink and the downlink on the user channel are below a first threshold", The combined BER, of the uplink and downlink, is compared to a threshold.].

Labonte et al. does not teach controlling BLER/BER of a first link and a second link. However, Melero teaches controlling BLER/BER of a first link and a second link [Melero, column 5, lines 50-54, "The base station is arranged to measure an uplink bit error rate (UL BER) for the transmission received from the mobile station. The UL BER is reported to the BSC in order to be used for statistics and the handover and power control mechanisms", The base station can control a BER level of multiple mobile terminals through power control according to statistics.].

Thus it would have been obvious to one of ordinary skill in the art at the time the invention was made to implement the teachings of Melero into Labonte et al., since Labonte et al. suggests a target BER value, and Melero suggests the beneficial use of

controlling a link BER such as to reach a total system BER [Melero, column 5, lines 50-54] in the analogous art of controlling and monitoring bit error rates.

9. **As per claim 4**, Labonte et al. in view of Mishra and Melero teaches the method according to claim 3. Labonte et al. also teaches characterised by the further step of:

setting the first BLER/BER target for the first link to 50% of the total BLER/BER target [Labonte, column 2, lines 30-34, "The system includes means for estimating the BER on an uplink and a downlink on a user channel, and means for determining whether the BER on the uplink and the downlink on the user channel are below a first threshold", If there is a total BER, comprising BERs from two links, it would be obvious to initially set the BER of one link to 50%.].

10. **As per claim 8**, Labonte et al. teaches a system for case controlled block error rate (BLER) or bit error rate (BER) target setting in Mobile to Mobile (MTM) and Mobile to Public Switched Telephone Network (MTPSTN) communication using Code Division Multiple Access (CDMA), characterised in

that a desired overall BLER/BER target value is defined for the system [Labonte, column 2, lines 30-34, "The system includes means for estimating the BER on an uplink and a downlink on a user channel, and means for determining whether the BER on the uplink and the downlink on the user channel are below a first threshold", The combined BER, of the uplink and downlink, is compared to a threshold.].

Labonte et al. does not teach a detection of a call being MTM or MTPSTN; and in case of a MTM call controlling the BLER/BER on a second link to give a total BLER/BER according to the total BLER/BER target.

However, Mishra teaches a detection of a call being MTM or MTPSTN [Mishra, fig. 5, step 510, column 5, lines 11-12, "If the outside act is an incoming call, the media type of the incoming call is determined, act 510", The call type is determined for the incoming call to determine the connection needed (see fig. 1).].

Thus it would have been obvious to one of ordinary skill in the art at the time the invention was made to implement the teachings of Mishra into Labonte et al., since Labonte et al. suggests a target BER value, and Mishra suggests the beneficial use of examining a media packet such as to determine the media type [Mishra, fig. 5, step 510, column 5, lines 11-12] in the analogous art of mobile communications.

Melero teaches in case of a MTM call [Melero, column 2, lines 20-24, "In a cellular radio communication system, such as the GSM based systems, voice quality in a transmission over a communication path between a base station and a mobile station can be assessed based on a network indicator determined for the connection", Mobile to Mobile calls occur in a GSM network, and the links between the mobile units can be controlled via the base station.] controlling the BLER/BER on a second link to give a total BLER/BER according to the total BLER/BER target [Melero, column 5, lines 50-54, "The base station is arranged to measure an uplink bit error rate (UL BER) for the transmission received from the mobile station. The UL BER is reported to the BSC in order to be used for statistics and the handover and power control mechanisms", The

base station can control a BER level of multiple mobile terminals through power control according to statistics.].

Thus it would have been obvious to one of ordinary skill in the art at the time the invention was made to implement the teachings of Melero into Labonte et al., since Labonte et al. suggests a target BER value, and Melero suggests the beneficial use of controlling a link BER such as to reach a total system BER [Melero, column 2, lines 20-24 & column 5, lines 50-54] in the analogous art of controlling and monitoring bit error rates.

11. **As per claim 9**, Labonte et al. in view of Mishra and Melero teaches the system according to claim 8. Labonte et al. does not teach characterised in that a MTM or MTPSTN call is detected by art inspection of frame types to be sent on the second link.

However, Mishra teaches characterised in that a MTM or MTPSTN call is detected by art inspection of frame types to be sent on the second link [Mishra, fig. 5, step 510, column 5, lines 11-12, "If the outside act is an incoming call, the media type of the incoming call is determined, act 510", The call type is determined for the incoming call to determine the connection needed (see fig. 1).].

Thus it would have been obvious to one of ordinary skill in the art at the time the invention was made to implement the teachings of Mishra into Labonte et al., since Labonte et al. suggests a target BER value, and Mishra suggests the beneficial use of examining a media packet such as to determine the media type [Mishra, fig. 5, step 510, column 5, lines 11-12] in the analogous art of mobile communications.

12. **As per claim 10**, Labonte et al. in view of Mishra and Melero teaches the system according to claim 8. Labonte et al. also teaches... that a first BLER/BER target [Labonte, column 2, lines 44-45, "whether the BER on the downlink on the FACCH channel is below a second threshold"] and a second BLER/BER target [Labonte, column 2, lines 45-46, "whether the RBER on the uplink is below a third threshold"] are separately set such that a sum of the first and second BLER/BER targets will be equal to the total BLER/BER target [Labonte, column 2, lines 30-34, "The system includes means for estimating the BER on an uplink and a downlink on a user channel, and means for determining whether the BER on the uplink and the downlink on the user channel are below a first threshold", The combined BER, of the uplink and downlink, is compared to a threshold.].

Labonte et al. does not teach characterised in that BLER/BER of a first link and the second link is controlled. However, Melero teaches characterised in that BLER/BER of a first link and the second link is controlled [Melero, column 5, lines 50-54, "The base station is arranged to measure an uplink bit error rate (UL BER) for the transmission received from the mobile station. The UL BER is reported to the BSC in order to be used for statistics and the handover and power control mechanisms", The base station can control a BER level of multiple mobile terminals through power control according to statistics.].

Thus it would have been obvious to one of ordinary skill in the art at the time the invention was made to implement the teachings of Melero into Labonte et al., since Labonte et al. suggests a target BER value, and Melero suggests the beneficial use of

controlling a link BER such as to reach a total system BER [Melero, column 5, lines 50-54] in the analogous art of controlling and monitoring bit error rates.

13. **As per claim 11**, Labonte et al. in view of Mishra and Melero teaches the system according to claim 10. Labonte et al. also teaches characterised in that

BLER/BER for the first link is set to 50% of the total BLER/BER target [Labonte, column 2, lines 30-34, "The system includes means for estimating the BER on an uplink and a downlink on a user channel, and means for determining whether the BER on the uplink and the downlink on the user channel are below a first threshold", If there is a total BER, comprising BERs from two links, it would be obvious to initially set the BER of one link to 50%.].

14. Claims 5 & 12 are rejected under 35 U.S.C. 103(a) as being unpatentable over Labonte et al. (US Patent No. 6,073,257) in view of Mishra (US Patent No. 6,950,402), Melero (US Patent No. 6,928,267), and Shah (US Patent No. 6,167,259).

15. **As per claim 5**, Labonte et al. in view of Mishra and Melero teaches the method according to claim 3. Labonte et al. does not teach characterised by the further step of: setting the second BLER/BER target to a difference between the total BLER/BER target and an estimated BLER/BER in blocks to be sent on the second link.

However, Shah teaches characterised by the further step of: setting the second BLER/BER target to a difference between the total BLER/BER target and an estimated BLER/BER in blocks to be sent on the second link [Shah, column 3, lines 13-17, "The BER on the forward 30 and reverse 32 links needs to be balanced, e.g., substantially equal, in order for both the calling party and the called party to perceive substantially

equivalent voice quality. In many instances, the BER is not substantially equal on the forward 30 and reverse 32 links", If rates can be balanced, it would be obvious to use a total BER and a link BER to find the BER of another link.].

Thus it would have been obvious to one of ordinary skill in the art at the time the invention was made to implement the teachings of Shah into Labonte et al., since Labonte et al. suggests a target BER value, and Shah suggests the beneficial use of balancing BER rates on links in conjunction with a total BER such as to render a link BER [Shah, column 3, lines 13-17] in the analogous art of controlling and monitoring bit error rates.

16. **As per claim 12**, Labonte et al. in view of Mishra and Melero teaches the system according to claim 10. Labonte et al. does not teach characterised in that the second BLER/BER target is set to a difference between the total BLER/BER target and an estimated BLER/BER in data to be sent on the second link.

However, Shah teaches characterised in that the second BLER/BER target is set to a difference between the total BLER/BER target and an estimated BLER/BER in data to be sent on the second link [Shah, column 3, lines 13-17, "The BER on the forward 30 and reverse 32 links needs to be balanced, e.g., substantially equal, in order for both the calling party and the called party to perceive substantially equivalent voice quality. In many instances, the BER is not substantially equal on the forward 30 and reverse 32 links", If rates can be balanced, it would be obvious to use a total BER and a link BER to find the BER of another link.].

Thus it would have been obvious to one of ordinary skill in the art at the time the invention was made to implement the teachings of Shah into Labonte et al., since Labonte et al. suggests a target BER value, and Shah suggests the beneficial use of balancing BER rates on links in conjunction with a total BER such as to render a link BER [Shah, column 3, lines 13-17] in the analogous art of controlling and monitoring bit error rates.

17. Claims 6 & 13 are rejected under 35 U.S.C. 103(a) as being unpatentable over Labonte et al. (US Patent No. 6,073,257) in view of Melero (US Patent No. 6,928,267).

18. **As per claim 6**, Labonte et al. teaches a method for case controlled block error rate (BLER) or bit error rate (BER) target setting for a radio link in a Code Division Multiple Access (CDMA) Mobile to Public Switched Telephone Network (MTPSTN) communication system, characterised by the step of:

defining a desired total BLER/BER target value [Labonte, column 2, lines 30-34, "The system includes means for estimating the BER on an uplink and a downlink on a user channel, and means for determining whether the BER on the uplink and the downlink on the user channel are below a first threshold", The combined BER, of the uplink and downlink, is compared to a threshold.];

estimating BLER/BER of blocks to be sent on a downlink [Labonte, column 2, lines 44-45, "whether the BER on the downlink on the FACCH channel is below a second threshold"].

Labonte et al. does not teach controlling BLER/BER on a second link to give a total BLER/BER equal to the desired total BLER/BER target. However, Melero teaches controlling BLER/BER on a second link to give a total BLER/BER equal to the desired total BLER/BER target [Melero, column 5, lines 50-54, "The base station is arranged to measure an uplink bit error rate (UL BER) for the transmission received from the mobile station. The UL BER is reported to the BSC in order to be used for statistics and the handover and power control mechanisms", The base station can control a BER level of multiple mobile terminals through power control according to statistics.].

Thus it would have been obvious to one of ordinary skill in the art at the time the invention was made to implement the teachings of Melero into Labonte et al., since Labonte et al. suggests a target BER value, and Melero suggests the beneficial use of controlling a link BER such as to reach a total system BER [Melero, column 5, lines 50-54] in the analogous art of controlling and monitoring bit error rates.

19. **As per claim 13**, Labonte et al. teaches a system for call case controlled block/bit error rate (BLER/BER) target setting in Mobile to Public Switched Telephone Network (MTPSTN) using Code Division Multiple Access (CDMA), characterised in that a desired overall BLER/BER target value is defined for the communication [Labonte, column 2, lines 30-34, "The system includes means for estimating the BER on an uplink and a downlink on a user channel, and means for determining whether the BER on the uplink and the downlink on the user channel are below a first threshold", The combined BER, of the uplink and downlink, is compared to a threshold.];

BLER/BER of blocks or bits to be sent on a second link is estimated [Labonte, column 2, lines 44-45, "whether the BER on the downlink on the FACCH channel is below a second threshold"].

Labonte et al. does not teach BLER/BER on the second link is controlled to give a total BLER/BER equal to the desired total BLER/BER target. However, Melero teaches BLER/BER on the second link is controlled to give a total BLER/BER equal to the desired total BLER/BER target [Melero, column 5, lines 50-54, "The base station is arranged to measure an uplink bit error rate (UL BER) for the transmission received from the mobile station. The UL BER is reported to the BSC in order to be used for statistics and the handover and power control mechanisms", The base station can control a BER level of multiple mobile terminals through power control according to statistics.].

Thus it would have been obvious to one of ordinary skill in the art at the time the invention was made to implement the teachings of Melero into Labonte et al., since Labonte et al. suggests a target BER value, and Melero suggests the beneficial use of controlling a link BER such as to reach a total system BER [Melero, column 5, lines 50-54] in the analogous art of controlling and monitoring bit error rates.

20. Claims 7 & 14 are rejected under 35 U.S.C. 103(a) as being unpatentable over Labonte et al. (US Patent No. 6,073,257) in view of Melero (US Patent No. 6,928,267), and Shah (US Patent No. 6,167,259).

21. As per claim 7, Labonte et al. in view of Melero teaches the method according to claim 6. Labonte et al. does not teach characterised by the further step of: controlling

BLER/BER of the second link separately using a difference between the desired total BLER/BER and an estimated BLER/BER in the blocks to be sent on the downlink as the BLER/BER target for the second link.

However, Shah teaches characterised by the further step of: controlling BLER/BER of the second link separately using a difference between the desired total BLER/BER and an estimated BLER/BER in the blocks to be sent on the downlink as the BLER/BER target for the second link [Shah, column 3, lines 13-17, "The BER on the forward 30 and reverse 32 links needs to be balanced, e.g., substantially equal, in order for both the calling party and the called party to perceive substantially equivalent voice quality. In many instances, the BER is not substantially equal on the forward 30 and reverse 32 links", If rates can be balanced, it would be obvious to use a total BER and a link BER to find the BER of another link.].

Thus it would have been obvious to one of ordinary skill in the art at the time the invention was made to implement the teachings of Shah into Labonte et al., since Labonte et al. suggests a target BER value, and Shah suggests the beneficial use of balancing BER rates on links in conjunction with a total BER such as to render a link BER [Shah, column 3, lines 13-17] in the analogous art of controlling and monitoring bit error rates.

22. **As per claim 14**, Labonte et al. in view of Melero teaches the system according to claim 13. Labonte et al. does not teach characterised in that BLER of the second link is controlled separately by using a difference between the desired total BLER/BER and

an estimated BLER/BER in data to be sent on the second link as the BLER/BER target for the downlink.

However, Shah teaches characterised in that BLER of the second link is controlled separately by using a difference between the desired total BLER/BER and an estimated BLER/BER in data to be sent on the second link as the BLER/BER target for the downlink [Shah, column 3, lines 13-17, "The BER on the forward 30 and reverse 32 links needs to be balanced, e.g., substantially equal, in order for both the calling party and the called party to perceive substantially equivalent voice quality. In many instances, the BER is not substantially equal on the forward 30 and reverse 32 links", If rates can be balanced, it would be obvious to use a total BER and a link BER to find the BER of another link.].

Thus it would have been obvious to one of ordinary skill in the art at the time the invention was made to implement the teachings of Shah into Labonte et al., since Labonte et al. suggests a target BER value, and Shah suggests the beneficial use of balancing BER rates on links in conjunction with a total BER such as to render a link BER [Shah, column 3, lines 13-17] in the analogous art of controlling and monitoring bit error rates.

Conclusion

23. The prior art made of record and not relied upon is considered pertinent to applicant's disclosure.

The reference Shiu et al. (US Patent No. 6,983,166) teaches a wireless communication system that supports target BLER values.

The reference Wan et al. (US Patent No. 6,539,205) teaches a device that estimates channel quality at a wireless base station.

24. Any inquiry concerning this communication or earlier communications from the examiner should be directed to Paul Masur whose telephone number is (571) 270-7297. The examiner can normally be reached on Monday through Friday from 7:00AM to 4:30PM (Eastern Time).

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Ricky Ngo can be reached on (571) 272-3139. The fax phone number for the organization where this application or proceeding is assigned is 571-273-8300.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free). If you would like assistance from a USPTO Customer Service Representative or access to the automated information system, call 800-786-9199 (IN USA OR CANADA) or 571-272-1000.

/P. M./
Examiner, Art Unit 2416

/Ricky Ngo/
Supervisory Patent Examiner, Art
Unit 2416